

### AMENDMENTS TO THE SPECIFICATION

Please rewrite the paragraph at page 2, line 36, as follows:

-- Fig. 3 an ~~IIR~~ Filter of the first order to determine the momentary power, --.

Please rewrite the paragraph at page 3, lines 25-31, as follows:

-- In the case of a transmission system in accord with IEEE802.11B Standard, the scrambler (2) is comprised of a retroactively connected shift-register with seven delay elements. As a type of modulation, in this case, a differential ~~BPSK~~ (DBPSK), a differential modulator (DQPSK), a "Complementary Code Keying" (CCK) or a "Packet Binary Convolutional Coding" (PBCC) are used. As a spreader code, a Barker-Code is employed. This is only mentioned to serve as an example. The invention is not limited to this application. --.

Please rewrite the paragraph at page 4, lines 1-8, as follows:

-- In Fig. 2 is presented the transmission model 5 of the measured stretch. The sending signal besides a frequency offset  $\Delta f$  and a phase offset  $\Delta \varphi$  is distorted by a noise factor, namely  $n(v)$ : wherein

$$r(v) = s(v) \cdot e^{-j2\pi\Delta f v} \cdot e^{-j\Delta\varphi} + n(v) \quad (1)$$

and where  $v$  is the chip index. If no spreading occurs, which is no presupposition of the invention, then  $v$  would be the bit-index. In the example presented in Fig. 2, the frequency displacement is modulated by a first multiplier 6, the phase offset by a second multiplier 7 and the noise modulated by an additive 8. --.

Please rewrite the paragraph at page 5, lines 4-13, as follows:

-- Fig. 4 shows the momentary (or instantaneous) signal strength  $P(v)$  as a function of the chip index  $v$ . From the chip index  $v$ , begins the active burst. At this location, lies the sought for initiation BB of the active signal packet BS, that is, the initial burst position. Because of the fact, that the momentary signal strength in accord with Eq. (2) will be calculated as the sliding average value, in which with a greater weighting, the previous momentary signal strength  $P(v-1)$  and with relatively lesser weighting the signal strength of the presently existing chips  $|r(v) - y|^2$ , then the so defined momentary signal strength  $P(v)$  slowly climbs from the beginning of the active signal packet BS, until it reaches saturation. After the overstepping of the signal strength threshold  $TH \cdot MIN\{P(v)\}$  begins the more exact search for the initiation of the burst BB with the correlation process to be described in the following. --.

Please rewrite the paragraph at page 6, lines 1-3, as follows:

-- This, with the description of the process with the aid of the equations (4) to (6) does not yet contain the frequency offset factor of the invention and, on this account, yields, only in ~~an~~ disadvantageous manner, a small partial correlation length  $N$ . --.

Please rewrite the Abstract as follows:

-- ABSTRACT OF THE DISCLOSURE

A process for detecting initiation (BB) of an active packet or burst in a digital received signal  $r(v)$  during use of a digital reference signal  $p(v)$  includes: (a) executing a correlation (S102, S103) by forming a cost function  $L(v_o)$  with a correlation function within a correlation function interval dependent upon a time delay of the received signal  $r(v)$  relative to ~~the~~a bit offset or ~~the~~a chip offset  $v_o$  characterized by a reference signal  $p(v)$ , whereby the addends of the correlation function were multiplied with a frequency offset correction factor, namely  $e^{-j2\pi\Delta\tilde{f}v}$ , which factor was characterized with a frequency offset  $\Delta f$  of the received signal  $r(v)$  relative to the reference signal  $p(v)$ ; and (b) seeking a maximum  $Max(L)$  of the cost function  $L(v_o)$  dependent upon the bit offset or the chip offset  $v_o$  and upon the approximate frequency offset  $\Delta\tilde{f}$  whereby maximum  $Max(L)$ , following a discrete Fourier Transform ( $FFT$ ) is sought in the frequency space. --